

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/078,853	05/14/1998	YASUSHI TAKAHASHI	450100-4486	7718
20999	7590 07/03/2006		EXAMINER	
FROMMER LAWRENCE & HAUG 745 FIFTH AVENUE- 10TH FL.			BROWN, RUEBEN M	
745 FIFTH AV NEW YORK,			ART UNIT PAPER NUMB	
,			2623	- ·
			DATE MAILED: 07/03/200	6

Please find below and/or attached an Office communication concerning this application or proceeding.

<u> </u>		Application No.	Applicant(s)	
		09/078,853	TAKAHASHI ET AL.	
	Office Action Summary	Examiner	Art Unit	
		Reuben M. Brown	2623	
Period fo	The MAILING DATE of this communication app or Reply	pears on the cover sheet with the c	orrespondence address	
A SH WHIC - Exter after - If NO - Failu Any r	ORTENED STATUTORY PERIOD FOR REPLY CHEVER IS LONGER, FROM THE MAILING DANSIONS of time may be available under the provisions of 37 CFR 1.13 SIX (6) MONTHS from the mailing date of this communication. Period for reply is specified above, the maximum statutory period ver to reply within the set or extended period for reply will, by statute reply received by the Office later than three months after the mailing and patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be timused and will expire SIX (6) MONTHS from a cause the application to become ABANDONE	I. lely filed the mailing date of this communicatio D (35 U.S.C. § 133).	
Status				
2a)⊠	Responsive to communication(s) filed on <u>02 Ju</u> This action is FINAL . 2b) This Since this application is in condition for allowar closed in accordance with the practice under E	action is non-final.		S
Dispositi	on of Claims			
5)	Claim(s) <u>15-20</u> is/are pending in the application 4a) Of the above claim(s) is/are withdraw Claim(s) is/are allowed. Claim(s) <u>15-20</u> is/are rejected. Claim(s) is/are objected to. Claim(s) are subject to restriction and/or	vn from consideration.		
Applicati	on Papers			
10)	The specification is objected to by the Examine of the drawing(s) filed on is/are: a) ☐ access Applicant may not request that any objection to the of Replacement drawing sheet(s) including the correction to the office oath or declaration is objected to by the Example 1.	epted or b) objected to by the Edrawing(s) be held in abeyance. See ion is required if the drawing(s) is obj	37 CFR 1.85(a). ected to. See 37 CFR 1.121(d	d).
Priority u	nder 35 U.S.C. § 119			
12)[/ a)[Acknowledgment is made of a claim for foreign All b) Some * c) None of: 1. Certified copies of the priority documents 2. Certified copies of the priority documents 3. Copies of the certified copies of the priority application from the International Bureau see the attached detailed Office action for a list of	s have been received. s have been received in Application ity documents have been received (PCT Rule 17.2(a)).	on No d in this National Stage	
	e of References Cited (PTO-892)	4) Interview Summary		
3) 🔲 Infom	e of Draftsperson's Patent Drawing Review (PTO-948) nation Disclosure Statement(s) (PTO-1449 or PTO/SB/08) r No(s)/Mail Date	Paper No(s)/Mail Da 5) Notice of Informal Pa 6) Other:	te atent Application (PTO-152)	

Application/Control Number: 09/078,853 Page 2

Art Unit: 2623

DETAILED ACTION

Response to Arguments

1. Applicant's arguments with respect to the claims have been considered but are not persuasive. Applicant argues that the time values discloses in Herz, '1' and 'u' are not time-variable coefficients, and do not have variable values other than there assigned times. Examiner respectfully disagrees and points out that the mood start and end times, are in fact variable, see col. 17, lines 38-41. As for the claimed linear interpolation, Herz teaches that the generic mood sf increases, as the window narrows, (col. 18, lines 1-11) which meets applicant's argument of linear interpolation, calculating an unknown value from a known value.

Furthermore, Herz specifically disclose that linear interpolation is used, "system may set a max value on sf... and do linear interpolation to find sf values for windows of greater widths.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

3. Claims 15-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Herz, (U.S.

Pat # 5,758,257).

Considering claim 15, the amended claimed information retrieval method comprising the

steps of:

'forming a general user model based upon statistical data obtained by audience research

on the actions of a plurality of users', 'the general user model having general user selection taste

data' reads on the use of demographic data discussed in Herz when generating an initial

customer profile, see col. 11, lines 61-67; col. 38, lines 18-25.

'statistical data including an audience rating for each of a plurality of genres' reads on the

disclosure in Herz that in Scheme B, the customer gives specific rating for each category, col. 12,

lines 21-25 and that that the initial value of the content profile is based upon this voting by the

other "experts" or viewers (col. 12, lines 41-55).

'plurality of life-scenes' is met by the plurality of moods based upon time of day, col. 17,

lines 45-55.

'wherein each user is classified according to various characteristics, including age, sex

and life-stage' Herz discusses the use of demographic information used to generate a user

Art Unit: 2623

profile, (col. 4, lines 42-50; col. 11, lines 60-67). However, Herz does not explicitly state that the demographic information includes age, sex and a life-stage value. Nevertheless, Official Notice is taken that the time the invention was made, it was well known in the art to include the specific parameters of age, sex, and life-stage (such as child, teen, or adult) within a demographic profile of a person. It would have been obvious for one of ordinary skill in the art a the time the invention was made, to modify the demographic profile of Herz to include the parameters of age, sex, and life-stage (such as child, teen, or adult), within a demographic profile of a customer, at least for the known purpose of more accurately describing the customer.

'inputting a user profile for a specific user', is met by col. 18, lines 1-45, which for instance delineates customers by "each customer i".

'forming an initial user model forming a user specific model based upon the general user model and a user profile', is met by Herz, col. 4, lines 32-55, which teaches that the initial customer profile may include demographic data, as well as a profile based upon user feedback data. Furthermore, Herz discusses adjusting the customer profile, (col. 13, lines 55-67; col. 14, lines 48-55 & col. 22, lines 56-67).

The additionally claimed feature of 'forming a study user model based upon the initial user model and information selection history of the specific user' is consistent with the teachings of Herz, see col. 29, lines 45-65; col. 30, lines 1-10 & col. 33, lines 12-21. Herz is directed to updating a customer's profile based upon the programs that are actually watched, col. 6, lines 35-

Application/Control Number: 09/078,853

Art Unit: 2623

60. The teachings of Herz, with respect to the agreement matrix, which utilizes an adjusted customer profile to generate and present a list of programs that the customer might likely desire, reads on the further claimed feature of retrieving information suiting the specific user based upon the study user model, see col. 19, lines 5-14; col. 40, lines 32-65.

"retrieving information suiting the specific user based on the study user model by calculating a genre taste value based on a request time for an EPG', reads on the discussion in Herz of the personalized EPG listings according to the user profile and time of day, col. 4, lines 58-67; col. 17, lines 45-67 & col. 18, lines 1-35 & col. 45, lines 10-34.

As for the additionally claimed feature of 'genre taste value being calculated using a life-scene/time function representing a relationship between the life-scene corresponding to the request time an a time-variable coefficient', Herz discloses that a particular customer may have programming according to moods, based upon the time of day, col. 17, lines 45-50. For instance, the violent mood may cover 6 a.m. to noon; peaceful mood 6p.m. to midnight; and speculative mood 8 p.m. to midnight, see col. 4, lines 59-64; col. 17, lines 45-62; col. 25, lines 9-12.

Moreover, in col. 18, lines 7-45, Herz specifically teaches that the customer mood will take on a time window superscript, this disclosure clearly reads on the claimed life-scene/time function.

Herz teaches that the window for viewing programming is expressed in the calculations as a pair of time variables '1' and 'u', which represent starting point and ending point of a window, respectively. However, the value "sf", which is with respect to time, reads on the claimed 'time-variable coefficient'.

As for the further amended feature of the 'time-variable coefficient being determined by a linear interpolation on the basis of eth request time', Herz teaches that the system may calculate the sf value, using linear interpolation, col .18, lines 1-18.

The claim additionally includes the feature of; 'rearranging and displaying the EPG based on a genre priority table formed using the retrieved information and the calculated genre taste value'. The claimed genre priority table reads on the tables shown on col. 21, lines 15-45, which first shows the content profiles of programs, and then the value, i.e. priority of the sample genre to specific customers. For instance the three-sample genre of programming (romance, high-tech & violence) have priority values of .166, .425 & .409, respectively for John. The instant sample genre has priority values of .292, .192 & .516, respectively for Mary.

Finally, col. 21, lines 55-67 shows the calculations for the agreement matrix for particular programs 1-10, as such Herz uses the calculated information to generate the list of recommended programs discussed above; again see col. 45, lines 34-55. It is disclosed that the EPG may be modified to include fields for the "virtual' channels, which reads on the claimed 'rearranging and displaying'.

Regarding the claimed feature that the 'general user taste data is dispersed data', the claimed feature reads on the discussion in Herz, that the agreement matrix is made up of a plurality of factors, see col. 10, lines 21-60 & col. 16, lines 19-65. The further claimed feature of

Application/Control Number: 09/078,853

Art Unit: 2623

the 'dispersed data including time related data', is met by the inclusion of Customer Moods & Time Windows, col. 17, lines 25-67.

The further claimed feature of the 'time related data being interpolated into continuous data by an interpolation method specified by an identification key', reads on the time/mood information being incorporated into the agreement matrix, col. 18, lines 6-35. The identification key is broad enough to read on the value { $f(l_i, u_i, l_f, u_j)$ }, which expresses the customer's dissatisfaction due to any (or no) mismatch between the time window of the customer mood (i) and the broadcast time of the program (j). Herz goes on to discuss how the function (f) changes as the mood window gets closer to or further away from the broadcast time, col. 18, lines 36-67.

The amended claim defining a life-scene/time function is met by the agreement scalar value "ac" calculated. Herz goes on to teach that an agreement matrix is generated from the scalars, see col. 19, lines 5-65 thru col. 20, lines 1-40.

Considering claim 16, 'wherein the interpolation method is a method of interpolating in accordance with a user attribute' is met by the at least by the customer mood being include in the agreement matrix calculation, col. 18, lines 19-35.

Considering claim 17, the claimed elements of an information retrieval apparatus comprises features that correspond directly with the subject matter recited in the method steps of claim 15 and are likewise treated.

Application/Control Number: 09/078,853

Art Unit: 2623

Considering claims 18-19, Herz discuss a storing means (memory 908) for storing the user profile and agreement matrix, col. 42, lines 40-60; col. 45, lines 19-37.

Considering claim 20, Herz teaches that the user profile and agreement matrix may be stored in memory at a CATV headend, col. 41, lines 20-65; col. 42, lines 1-10 & col. 43, lines 1-20.

Conclusion

4. THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Application/Control Number: 09/078,853 Page 9

Art Unit: 2623

Any response to this action should be mailed to:

Commissioner for Patents P.O. Box 1450 Alexandria, VA 22313-1450 www.uspto.gov

or faxed to:

(703) 872-9306, (for formal communications intended for entry)

Or:

(703) 746-6861 (for informal or draft communications, please label "PROPOSED" or "DRAFT")

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Reuben M. Brown M. Brown whose telephone number is (571) 272-7290. The examiner can normally be reached on M-F(8:30-6:00), First Friday off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Christopher Kelley can be reached on (571) 272-7331. The fax phone numbers for the organization where this application or proceeding is assigned is (703) 872-9306 for regular communications and After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703)305-4700.

nynlm

Reuben M. Brown